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CLAIMS:

1. An enclosure for a medical electrode (12) which seals the electrode against moisture loss while the electrode remains in electrical communication with a medical instrument (200) comprising:

an enclosure (10) formed of flexible material (32) which is adapted to be sealed against moisture loss;

an interior connector (30) located on the interior (34) of the enclosure and adapted to connect to a medical electrode (12); and

an exterior connector (31) located on the outside (36) of the enclosure and adapted to connect to a medical instrument (200), the exterior connector being in electrical communication (27) with the interior connector.

- 2. The enclosure of Claim 1 further comprising: a medical electrode (12) having a wireset 14 coupled to the interior connector, wherein the medical electrode is sealed inside of the enclosure.
- The enclosure of Claim 1 further comprising:
 a medical electrode (12) having a wireset 14 coupled to the interior connector; and
 a medical instrument (200) coupled in electrical communication with the exterior
 connector.
- 4. The enclosure of Claim 1, wherein the enclosure (10) has a wall (32) of flexible material,

wherein the interior and exterior connectors are sealed through a hole in the wall of flexible material.

5. The enclosure of Claim 4, further comprising a flange (22) having the interior and exterior connectors located on opposite sides (18,19) thereof,

wherein the flange is sealed to a hole in the wall of flexible material.

6. The enclosure of Claim 4, further comprising a flange (22) having the interior and exterior connectors located on opposite sides (18,19) thereof,

wherein the flange is heat-sealed to the periphery of a hole in the wall of flexible material.

- 7. The enclosure of Claim 5, wherein the flange is formed of a rigid insulative material.
- 8. The enclosure of Claim 5, wherein the flange is formed of a rigid insulative, heat-sealable material.
- 9. The enclosure of Claim 2, wherein the electrode (12) is detachably connected to the interior connector (30), the interior connector is in electrical communication with the exterior connector, and the exterior connector (31) is detachably connected to the signal path of a medical instrument (200),

wherein the medical instrument is adapted to monitor the functioning of the electrode (12) via the signal path.

- 10. The enclosure of Claim 1, wherein the medical instrument (200) comprises an external defibrillator.
- 11. The enclosure of Claim 1, wherein the enclosure (10) of flexible material (32) comprises a hermetically sealable pouch for storing the electrode.
- 12. The enclosure of Claim 1, wherein the interior connector and the exterior connector comprise an electrical connector having the first end (30) disposed in the interior (34) of the enclosure, and a second end (31) disposed on the exterior (36) of the enclosure.
- 13. The enclosure of Claim 3, wherein the medical instrument (200) further comprises an electrical plug adapted to connect to the exterior connector.
- 14. A method for packaging a medical electrode (12), comprising: providing a sealable flexible enclosure (10) having an interior connector (30) in the inside (34) of the enclosure and an exterior connector (31) on the outside (36) of the

enclosure, the interior and exterior connectors being in electrical communication with each other;

disposing a medical electrode (12) in the interior of the enclosure and in electrical communication with the interior connector (30);

sealing the enclosure to retard moisture loss; and connecting the exterior connector (31) to be in electrical communication with a medical instrument (200).

- 15. The method of Claim 14, wherein sealing the enclosure comprises heat-sealing the enclosure.
- 16. The method of Claim 14, wherein providing a flexible enclosure further comprises sealing a rigid insulator (22) in a hole in a wall (32) of the enclosure,

wherein the interior and exterior connectors are disposed on opposite sides of the insulator (22) and in electrical communication therethrough.